

Azure Devops

Learning Outcomes

- Azure Repos
- Azure Boards
- Azure Pipelines
- Azure Test Plans
- Azure Artifacts

Prerequisites

- Azure Subscription
- Azure Devops account
- Visual Studio 2017 or later (OR any other IDE like Eclipse, VS Code, WebStorm, etc)



Why **Azure Devops?**

Agile development



Azure Devops

- VSTS is now renamed to **Azure Devops**
- Offers **integration** with many tools
- Provides **security** and **monitoring**

Devops Toolkit

Boards

Project tracking

Repos

Source Control

Pipelines

CI / CD

Test
Plans

Testing

Artifacts

Package management

Azure Repos

Azure Repos

Source Control

Branching

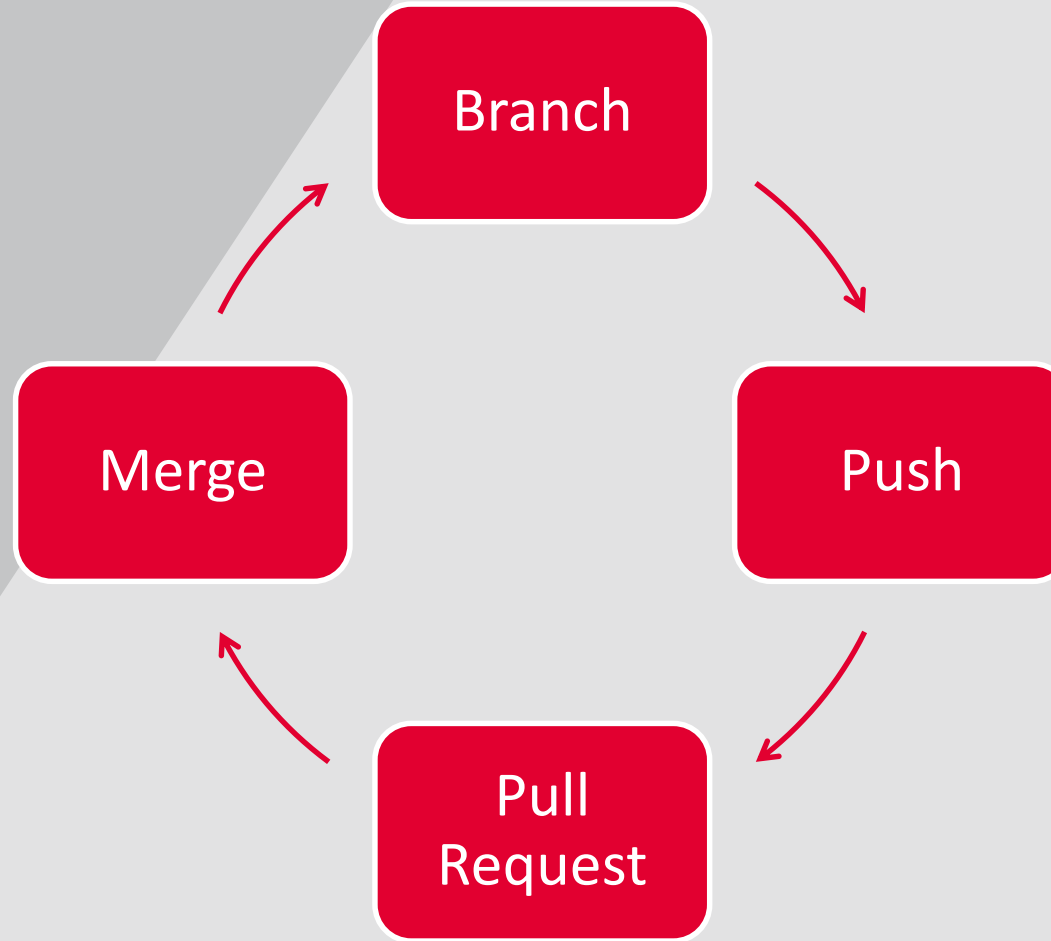
History

What is **Branching?**

Features

- Isolate the work from the master branch
- Allow only limited users to access the branch
- Enforce who are allowed to create branch
- Guarantees that changes are build before merging with master

Focus Areas

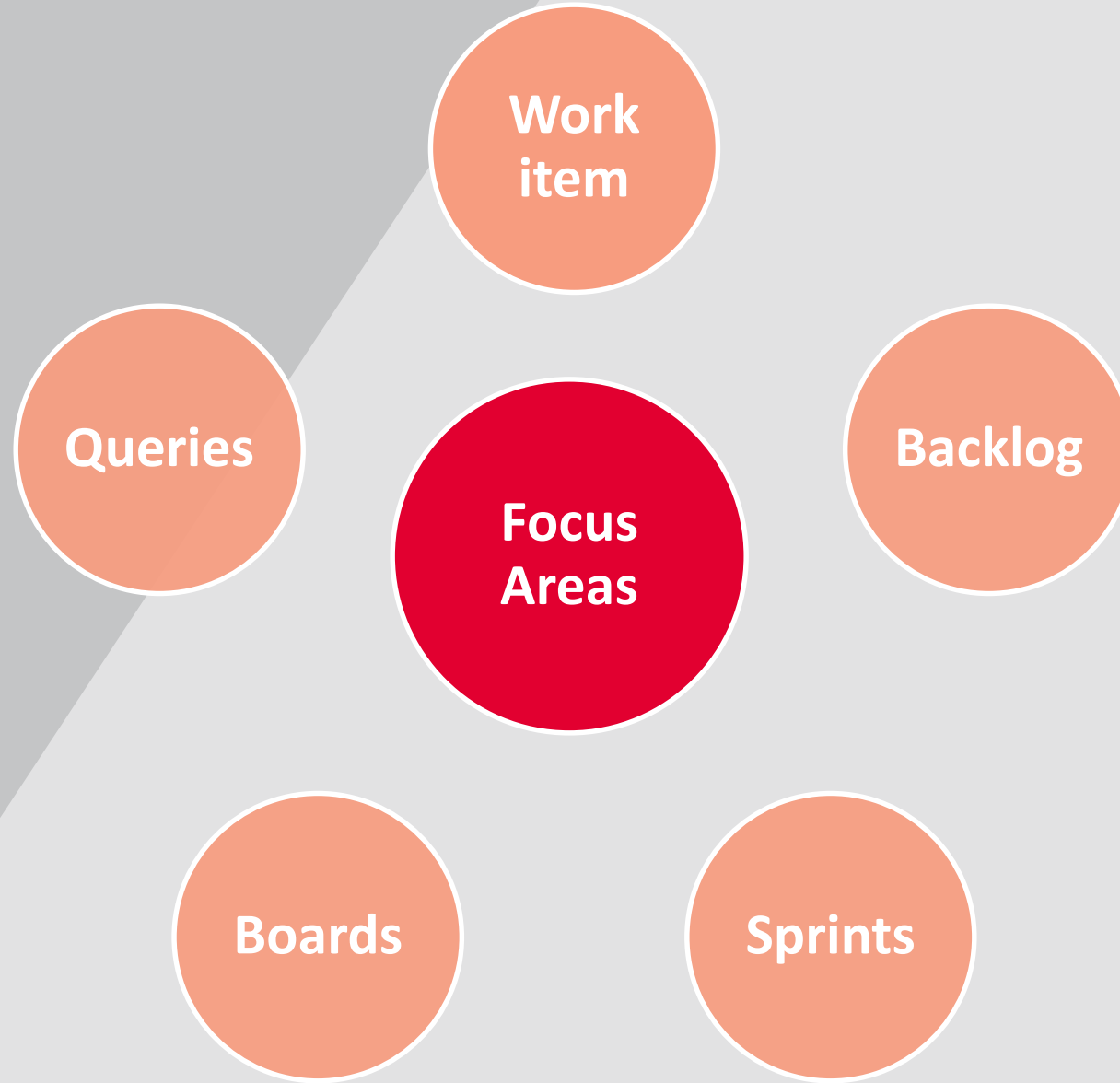


Azure Boards

Azure Boards : Features

- Provides **tools** to support Agile development
- Built-in **Scrum boards**
- **Gain insight** about health of the project

Focus Areas



Azure Pipelines

Features: Azure pipelines

- Build automation
- Deployment automation
- Continuous integration
- Continuous delivery
- Traceability

Independent of
language and platform

Deploy to various
targets simultaneously

Pipeline Advantages

Integration with
Azure deployments

Integration
with GitHub

Work with open
source projects

Concepts: Agents

Microsoft Hosted Agent

Self Hosted Agent

Azure Test Plans

Capabilities: Manual Testing

- Planned manual Testing
- User acceptance Testing
- Exploratory Testing
- Stakeholder feedback

Features: Azure Test Plans

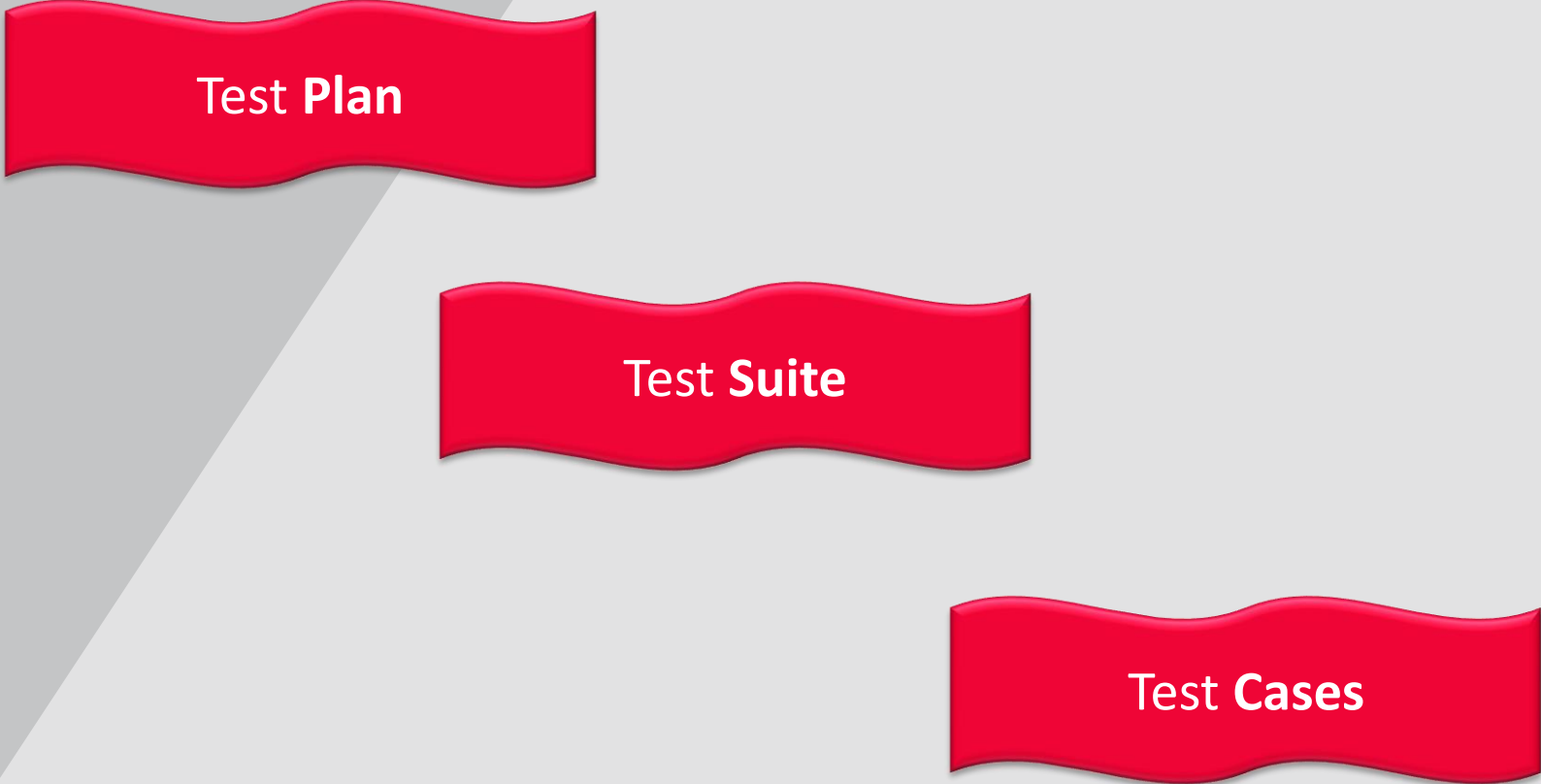
Exploratory testing

Apprehend data

Diverse testing

Traceability

Test Management Artifacts



Test Plan

Test Suite

Test Cases

Azure Artifacts

Features

Management of packages for traceability

Artifacts repository for the application

Track external package usage

Traceability and security

Thank you